

THE NOMENCLATURE OF THE VENERIDÆ: A REPLY TO
DR. W. H. DALL.

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IN the September number of these "Proceedings" there is a short article on this subject by Dr. W. H. Dall which contains many statements that cannot be passed over in silence. Dr. Dall naturally defends his own views on nomenclature and generic grouping, but he also makes assertions which cannot be supported, e.g. when he declares my writings to show that my "idea of the relation of species is largely based on superficial characters".

I am quite sure that anyone who carefully peruses my papers on the Veneridæ will see that my generic groups are based on a full consideration of all the characters of the shells, internal as well as external, and that I have not allowed myself to magnify the importance of some one or two characters, as Dr. Dall has done in the case of the *Mercenaria* group, which he separates from the *Chione* group on small differences of sculpture and tooth-granulation. I unite them under the name of *Venus*.

Again, it is not correct to say that in uniting *Protothaca* with *Chione* I ignore "the anatomical differences, the pallial sinus, the hinge, and everything except the more or less reticulate surface sculpture". Dr. Dall has apparently forgotten that in 1907 I wrote to him about this very group, expressing my surprise that he had detached it from *Chione* and had placed it under *Tapes*. I then asked him his reasons for doing so, since they were not obvious from his description of the *Protothaca* shell, and I inquired about the anatomy of the animal. The following was all the reply which he vouchsafed: "In putting *Protothaca* under *Paphia*, or associated with the European forms, I have perhaps been biassed by the uniform practice of naturalists for more than a century, but on reflection I see no reason to change the location." I have only two comments to make on this extraordinary statement—first, that if true it would be a very weak argument; secondly, that it is incorrect. It has not been the uniform practice of conchologists to refer these shells to *Tapes*; the practice in Europe has been to refer them to *Chione*; thus Deshayes in 1853 placed most of the species under *Chione*, though he referred the type (*Venus Dombeyi*) to his *Venus* group; the Messrs. Adams adopted the same grouping in 1857; by Römer in 1867 they were all included under *Chione*. I need only add that the principal species were listed as *Chione* by G. B. Sowerby in his Catalogue of the Peleceypoda (1903) to prove the inaccuracy of Dr. Dall's statement.

It must also be noticed that Dr. Dall's reply to my inquiry omits any reference to anatomical differences. It is true that in his Synopsis of 1902 he says of the animal of *Protothaca* that "the

siphons are short and united, the foot hatchet-shaped and not byssiferous", while under *Chione* he states that the siphons are short and separate; but if this latter statement is meant to apply to all sections of *Chione*, as seems to be intended, then it is erroneous, for most of the European species have their siphons more or less united. The common *C. gallina* and the British variety *C. striatula* have siphons united for more than half their length; in *C. fasciata* they are united for about half the length, and of *C. (Timoclea) ovata* Forbes & Hanley say that "the siphons are united nearly to the extremities, but they diverge at the ends". The length of the siphons varies in different species and sections of *Chione*.

Consequently the *onus probandi* rests upon Dr. Dall, not upon me. If he still persists in his opinion he must justify it by a full and complete comparison, stating clearly the characters in which he thinks *Protothaca* (both shell and animal) differs from *Chione*, and those in which it resembles *Tapes*. In my opinion the hinge is that of *Chione* and not that of *Tapes*. The only point, so far as I can see, in which *Protothaca* resembles the latter more than the former is in the pallial sinus, which is deeper and more rounded at the extremity than in typical *Chione*, but some species of the *Timoclea* section, such as *T. gallinula* and *T. lagopus*, have a similar rounded sinus.

Dr. Dall makes another extraordinary statement when he writes that because genera proposed with only one species are monotypical, "on this basis I have regarded the species cited in Lamarck's Prodomme of 1799 as typical of the genera *accepted* or proposed by him in that publication." The italics are mine, for there is all the difference in the world between proposing a new genus and accepting an old one! The example given by Lamarck for his genus *Meretricis* is of course to be taken as the type, but that given for the Linnæan genus *Venus* is not necessarily the type, because he did not specify it as such. Hence it is untrue to say that I have objected to "the acceptance of the monotypical genus". Dr. Dall must have read my paper very carelessly, or he would not have failed to notice that I began by drawing attention to the recent decision of the International Committee on Zoological Nomenclature to the effect that "mention of a species as an illustration or example of a genus does not constitute a selection of a type".

I do maintain that *Gafrarium* (as adopted by the Adams brothers) is monotypical, because the five supposed species listed by the Adams are now acknowledged to be only varieties of one species, and I quoted Dr. Dall's own statement to that effect, viz. that "the type and sole recent species is *Venus fimbriata*, Linn."

If Bolten's names are to be accepted *Corbis* must give way to *Gafrarium*, but I trust that the rigid application of the priority rule will not be enforced. I entirely approve of the proposal that the International Committee should publish an official list of generic names, and that they should be authorized to establish certain names which have been in general use for half a century or more on a permanent basis by exempting them from change. I would, in fact,

have them bar the use of any of Bolten's names in preference to those of Lamarck.

I also continue to maintain that Dr. Dall made a mistake in his selection of a type for *Paphia* (Bolten). As he repudiates having made any mistake, I proceed to make it more clear. In selecting a type for *Paphia* in 1903 he proceeded by elimination only without any other consideration, for he wrote simply, "from *Paphia*, Bolten, *Sunetta* and *Meretrix* have been eliminated, leaving only species ordinarily called *Tapes*, which must retain Bolten's name." That is true, but what are we to understand by the genus *Meretrix*? Dr. Dall himself claims it as 'monotypical', and it certainly can only carry the species of the *Venus meretrix* group, not the large and comprehensive assemblage afterwards catalogued by Lamarck. For the purpose of elimination the genus *Meretrix* is that recognized by modern conchologists (including Dr. Dall) and typified by *V. meretrix*, and no such *Meretrix* occurs in Bolten's list. No one would now include in this genus the *Callista* or *Macrocallista* type, i.e., either *Venus chione*, Linn., or *V. gigantea*, Gmelin, which under the name of *V. ala-avis* is the first species on Bolten's list.

Since we cannot adopt the name *Callista* from Poli, and since *Macrocallista* was not proposed till 1876, while *Tapes* was established by Megerle in 1811, I hold that *Tapes* was wrongly displaced by Dr. Dall, who should have eliminated the species of *Tapes* and have selected *V. ala-avis* as the type of Bolten's *Paphia*. The question is, does such a mistake invalidate his selection of a type, or is any selection good on whatever grounds it is made? The Committee can solve the question in this case by simply authorizing the use of the name *Callista* for the *Venus chione* group.